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Murine Calcivirus Virgin 10/757,832 56029/45752 1 / 11

A		
	mouse strain	dead/total
Passage 0	RAG/STAT-/-	5/6
Passage 1	RAG/STAT-/-	15/15
Passage 2	IFNαβγR-/-	15/15
	IFNαβγR-/- (filtered) 9/13
	129	0/4

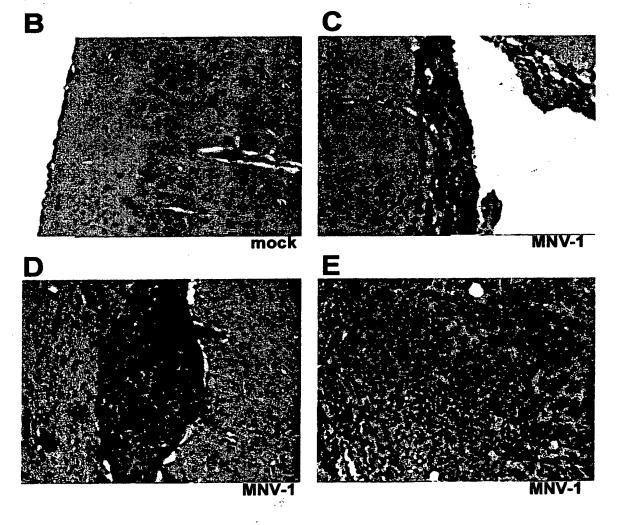


Figure 1

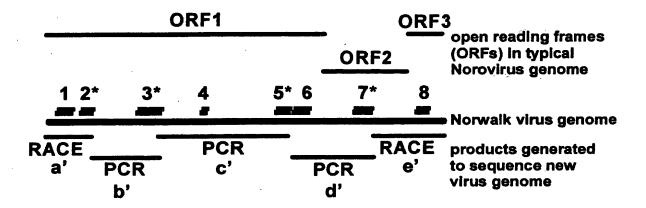
Title: Inventor(s): Murine Calcivirus

Appln. No. Docket#

Virgin 10/757,832 56029/45752 2/11

Discovery and sequencing of new virus genome

Norwalk virus genome (7654 bp) as a framework



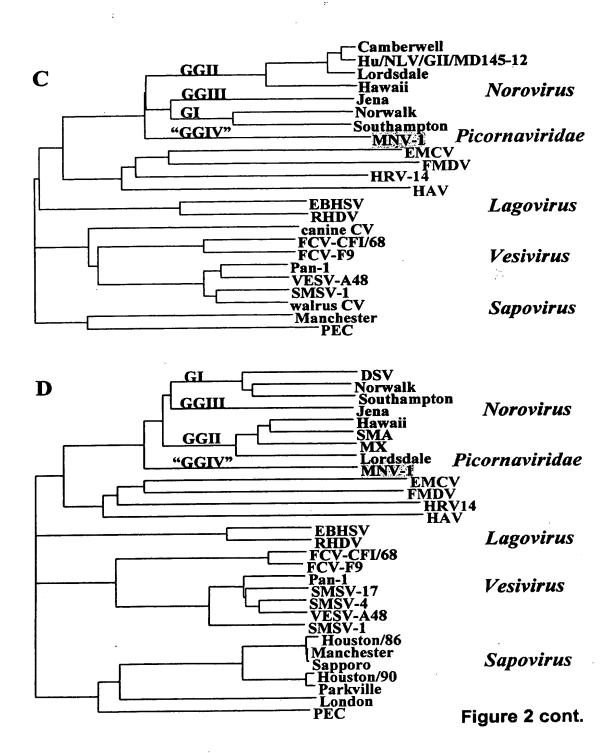
В **MNV-1** genome (7726 bp) ORF2 ORF3 ORF1 (1626 aa) (542 aa) (209 aa) 2C helicase 3D polymerase 3C protease

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Murine Calcivirus Virgin

10/757,832 56029/45752

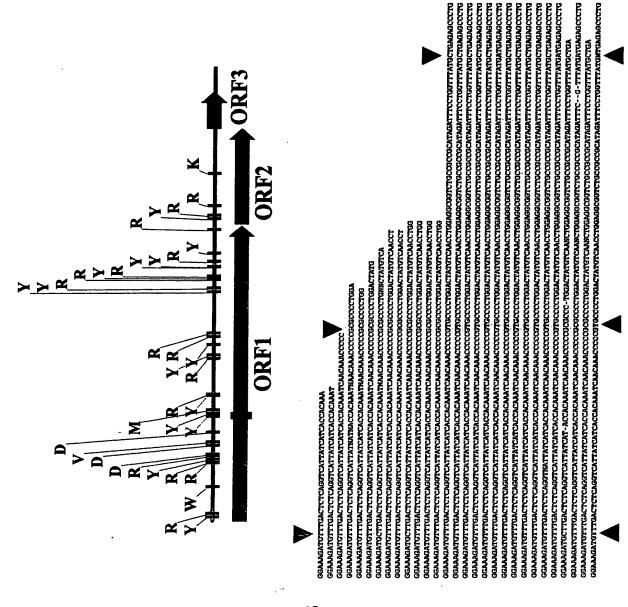
3/11



Murine Calcivirus Virgin 10/757,832 56029/45752

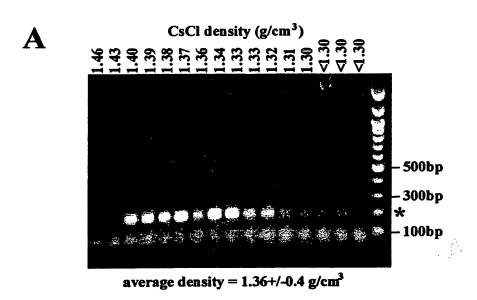
4/11

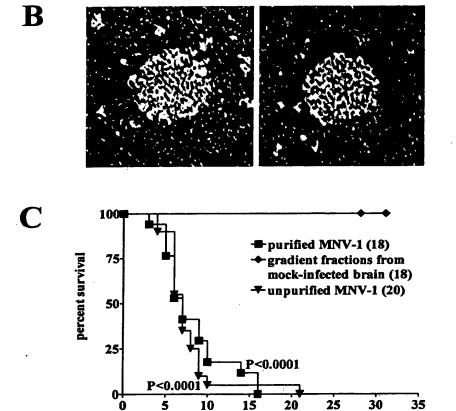
Figure 3



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Inventor(s): Virgin
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days post-infection

Figure 4

Title:

Murine Calcivirus

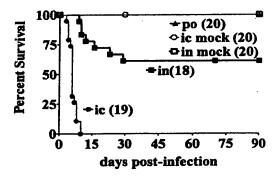
Inventor(s): Appln. No. Docket # Virgin 10/757,832 56029/45752

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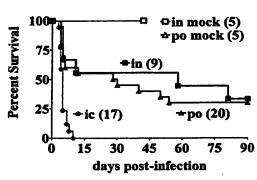
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	1	٩
2	c	7

Mouse strains demonstrating no mortality after challenge with MNV-1				
Mouse strain	Inoculation route, and number of mice inoculated			
	ic (30dpi)	in (90 dpi)	po (90 dpi)	
129	20	10	20	
B6	20	not done	not done	
RAG-/-	20	not done	not done	
IFNαβR-/-	19	10	10	
IFNγR-/-	19	10	not done	
iNOS-/-	20	not done	20	
PKR-/-	19	not done	20	

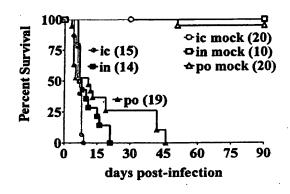
B: IFN $\alpha\beta\gamma$ R-/-



C: STAT1-/-



D: RAG/STAT-/-



E: STAT/PKR-/-

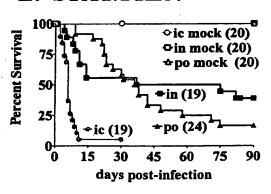
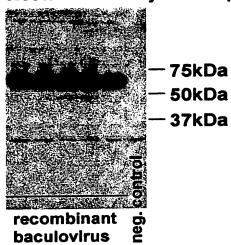


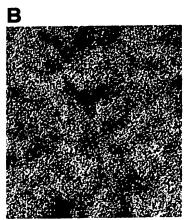
Figure 5

Murine Calcivirus Virgin 10/757,832 56029/45752

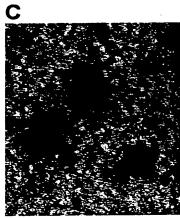
Western blot analysis of capsid protein expression



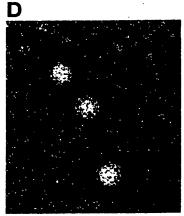
negative stain EM of MNV-1 VLPs



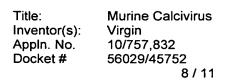
Baculovirus LacZ (negative control)



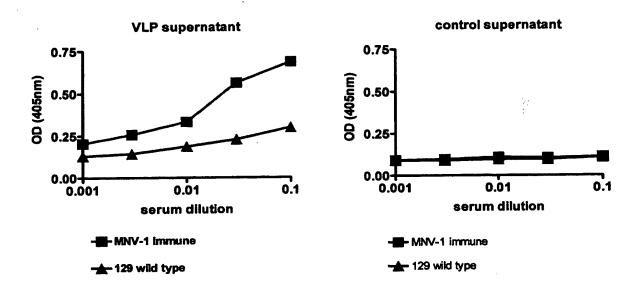
VLPs in infected cell supernatants



purified VLPs



A



B

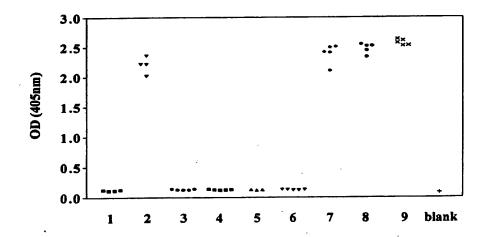


Figure 7

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Tissue MCV1 RNA levels after infection via different routes

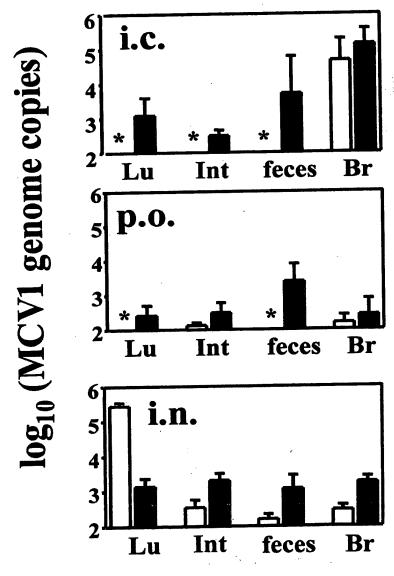


Figure 8

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Spleen sections of STAT1-/- 3dpi after p.o. inoculation with MNV-1

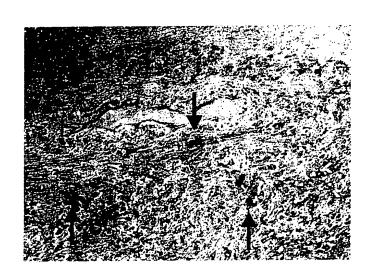


Figure 9

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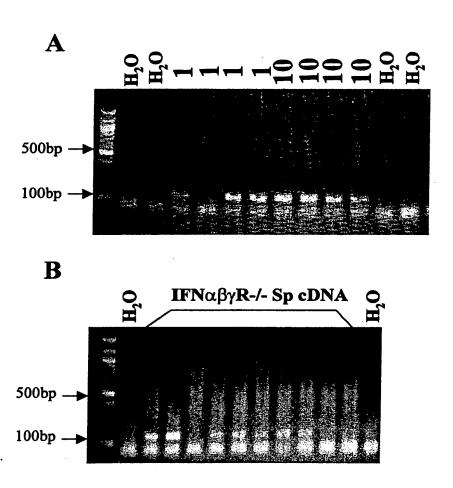


Figure 10